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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/565,299	07/12/2006	Fabrizio Donazzi	09875.0359	7099
	7590 01/17/200 IENDERSON FARAR	2008 ABOW, GARRETT & DUNNER EXAMINER		INER
LLP			TADAYYON ESLAMI, TABASSOM	
	RK AVENUE, NW N, DC 20001-4413		ART UNIT PAPER NUMBER	
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

		Application No.	Applicant(s)			
Office Action Summary		10/565,299	DONAZZI ET AL.			
Office Action of	annia y	Examiner	Art Unit			
		Tabassom T. Tadayyon-Eslami	1792			
Period for Reply	this communication app	ears on the cover sheet with the c	orrespondence address			
WHICHEVER IS LONGER, F - Extensions of time may be available ur after SIX (6) MONTHS from the mailing - If NO period for reply is specified above - Failure to reply within the set or extend	ROM THE MAILING DA ider the provisions of 37 CFR 1.13 g date of this communication. e, the maximum statutory period ved period for reply will, by statute, than three months after the mailing	Y IS SET TO EXPIRE 3 MONTH(SATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be time will apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONEI date of this communication, even if timely filed	I. lely filed the mailing date of this communication. C) (35 U.S.C. § 133).			
Status						
1) Responsive to commur	nication(s) filed on 18 De	ecember 2003.				
2a) ☐ This action is FINAL .	• • • • • • • • • • • • • • • • • • • •	action is non-final.				
3) Since this application is						
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims)				
Applicant may not reques Replacement drawing she	is/are withdraw illowed. ejected. ejected to. eject to restriction and/or ected to by the Examine is/are: a) accept that any objection to the elect(s) including the correct	vn from consideration. r election requirement.	e 37 CFR 1.85(a). ected to. See 37 CFR 1.121(d).			
,—	is objected to by the Lx	arriller. Note the attached Office	Action of John F 10-132.			
Priority under 35 U.S.C. § 119 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No. EP03/08194. 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received.						
Attachment(s)						
1) Notice of References Cited (PTO-8 2) Notice of Draftsperson's Patent Dra 3) Information Disclosure Statement(s Paper No(s)/Mail Date 01/20/2006.	awing Review (PTO-948)	4) Interview Summary Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:	ite			

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DETAILED ACTION

Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 20-29, 33, 35-37 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bernard Pierre et al (U. S. Patent: 4225749, here after Pierre), in view of Sergio Belli et al (WO/ 99/ 33070, here after Belli) and further in view of Luca Balconi et al (U. S. Patent: 2006/0051499, here after 499).

Claim 20 is rejected. Pierre teaches a continues process for manufacturing an electric cable comprising coating a conductor with an insulating layer in a radially outer position with respect to the conductor and form a circumferentially closed metallic sheath around the insulating layer [column 1 lines 54-66, fig. 2]. He further teaches the insulating layer is extruded around the conductor [column 2 lines 20-23]. It is also obvious that the conductor is feeding within the processing apparatus (fig. 2) with a predetermined speed. If the speed of feeding the conductor is very high, then the primer coating (16) may not apply uniformly or forms as a very thin layer on the conductor [fig. 2] and if the feeding speed is very slow, then the coating becomes very thick. Therefore it would have been obvious to one of ordinary skill in the art at the time of invention was made to have a method that Pierre teaches where the conductor is fed at a predetermined speed, because it is obvious that the feeding speed is result effective

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variable. Pierre does not specifically teach the insulating layer is thermoplastic; neither toooling down the insulating layer to less than 70 C, nor the metallic shield being a screen. Belli teaches a method of making electrical cables comprising a conductor core (1), expanded insulating layer (5) and a metal shield (6) [page 3 lines 11-20, page 7 lines 34-35 and page 8 lines 13], where the insulator *expanded layer) is a thermoplastic polymer [page 10 line 3]. Therefore it would have been obvious to one of ordinary skill in the art at the time of invention was made to have a method that Pierre teaches where the insulating layer is thermoplastic polymer, because Belli teaches it is suitable to use thermoplastic material as insulating layer for electrical cables. None of the above references teach the circumferentially closed metallic shield is a metallic screen nor extruded insulating layer is cooled down to less than 70 C (and then coat with the metal layer). 499 teaches a method for producing cable [0001] comprising a conductive core (2) insulator shield (8) and a circumferentially closed metallic shield metallic shield (7) [fig. 2, 0022-0024]. He further teaches the metallic shield is a metallic screen [0019, 0022]. Therefore it would have been obvious to one of ordinary skill in the art at the time of invention was made to have a method that Pierre teaches where the metallic shield is a metallic screen, because 499 teaches it is suitable to have metallic screen to surround the cable core as a metallic shield. 499 also teaches the cable is cool down to room temperature(less than 70C) before the metallic screen is wrapped around it [0100, 0101]. Therefore it would have been obvious to one of ordinary skill in the art at the time of invention was made to have a method that Pierre teaches where

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the insulating layer is cooled down to the room temperature, because 499 teaches it is suitable to cool down the cable before applying the metallic layer.

Claims 21-22 are rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and 499 teaches cooling down the insulating layer to room temperature (27 C) which is close to the claimed range0100, 0101, *MPEP 2144.05.I*]. Generally, differences in temperature will not support the patentability of subject mater encompassed by the prior art unless there is evidence indicating such temperature is critical [MPEP 2144.05II.A].

Claim 23 is rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and Pierre teaches longitudinally folding a metal sheet around the insulating layer [column 2 lines 23-26].

Claim 24 and 25 are rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and Pierre teaches folding the metal sheet round the cable by means of a shaping device (fig. 1) [column 2 lines 25-29 and 55-58] and from it is obvious that the edges of the metal sheet are overlapping and bonding to surround and protect the entire structure. The edges are bonded, because Pierre teaches after forming the metal sheet around the cable, a plastic sealing sheath forms around the metallic sheath [column 2 lines 58-65], therefore it bond the edges of the metallic foil together.

Claim 26 is rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and 499 teaches the conductor is in form of rod [2 in fig. 1 or fig. 2]. Therefore it would have been obvious to one of ordinary skill in the art at the time of

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invention was made to have a method that Pierre teaches where the conductor is supplied in a form of rod, because 499 teaches it is appropriate to supply the conductor in form of rod.

Claim 27 is rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and Pierre teaches applying a primer layer (sealing compound) around the metallic sheet [column 2 lines 47-55].

Claim 28 is rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and Pierre teaches applying the primer layer is carried out by extrusion [48-52].

Claims 29 and 33 are rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and Pierre teaches applying impact protecting element (over sheath) around circumferentially closed metallic screen [column 2 67lines 58-60].

Claim 35 is rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and 499 further teaches cooling the extruded insulating layer by feeding the conductor with the insulating layer longitudinally to the cooling device [18 in fig. 3, 0083 and 0088].

Claim 36 is rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and Belli teaches the thermoplastic material is polypropylene [page 10 lines 3]. Therefore it would have been obvious to one of ordinary skill in the art at the time of invention was made to have a method that Pierre teaches where the insulating layer is thermoplastic polypropylene, because Belli teaches it is suitable to use thermoplastic polypropylene as insulating layer for electrical cables.

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Claim 37 is rejected. Pierre, Belli and 499 teach the limitation of claim 20 as discussed above and Pierre teaches the polymer is polyethylene [column 1 lines 51-52].

3. Claims 30, 33-34 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bernard Pierre et al (U. S. Patent: 4225749, here after Pierre), Sergio Belli et al (WO/ 99/ 33070, here after Belli) and Luca Balconi et al (U. S. Patent: 2006/0051499, here after 499) as applied to claim 20 above and further in view of Sergio Belli et al (U. S. patent: 6501027, here after 027).

Claims 30, 33 and 34 are rejected. Pierre, Belli and 499 teach the limitation of claim 29 as discussed above. Bellie teaches the polymer layer (5) is expanded layer. They do not teach applying an impact protecting element comprises the step applying a non-expanded polymeric layer around the metallic screen. 027 teaches a coating for cable which is capable to protect the cable against impacts [abstract]. He further teaches applying a coating of non-expanded layer polymeric layer around the metallic screen [column 15 lines 28-37]. Therefore it would have been obvious to one of ordinary skill in the art at the time of invention was made to have a method that Pierre teaches where an impact protecting layer applied circumferentially around the metallic layer comprises non expanded polymer layers where the non expanded polymer layer is applying an over sheath around the metallic screen, because 027 teaches it is suitable to have the impact protecting layer around the cable.

Claims 31-32 are rejected under 35 U.S.C. 103(a) as being unpatentable over Bernard Pierre et al (U. S. Patent: 4225749, here after Pierre), Sergio Belli et al (WO/ 99/ 33070, here after Belli) and Luca Balconi et al (U. S. Patent: 2006/0051499, here

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after 499) as applied to claim 29 above and further in view of Sergio Belli et al (WO 03/088274A1 here after 274). Pierre, Belli and 499 teach the limitation of claim 29 as discussed above. 274 teaches a method of making cables for power transmission at low voltage [abstract] and he further teaches the step of applying expanded polymer over un-expanded polymer as the outer most protective layer around an electrical cable [abstract] to increase the peeling-off property of the cable [page 6 lines 13-16]. Therefore it would have been obvious to one of ordinary skill in the art at the time of invention was made to have a method that Pierre teaches where the expanded polymeric layer is applied around the non-extended polymeric layer, because 274 teaches it increase the peeling-off property of the cable.

4. Claim 38 is rejected under 35 U.S.C. 103(a) as being unpatentable over
Bernard Pierre et al (U. S. Patent: 4225749, here after Pierre), Sergio Belli et al (WO/
99/ 33070, here after Belli) and Luca Balconi et al (U. S. Patent: 2006/0051499, here
after 499) as applied to claim 20 above and further in view of Sergio Belli et al (U. S.
Patent Application: 2004/0091631, here after 631). Pierre, Belli and 499 teach the
limitation of claim 20 as discussed above. They do not teach the thermoplastic polymer
material of the insulating layer includes a predetermined amount of a dielectric liquid.
631 teaches a method of producing cables comprising extruding a thermoplastic
material of at least one thermoplastic polymer and at least one dielectric liquid
[abstract]. He further teaches adding a predetermined amount of liquid dielectric [0080]
to prevents the occurrence of partial discharges and thus per formation of the electric
insulation [0007 lines 5-8]. Therefore it would have been obvious to one of ordinary skill

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in the art at the time of invention was made to have a method that Pierre teaches where the thermoplastic polymer material of the insulating layer includes a predetermined amount of a dielectric liquid, because 631 teaches adding the liquid dielectric prevents the occurrence of partial discharges and thus per formation of the electric insulation.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tabassom T Tadayyon-Eslami whose telephone number is 571-270-1885. The examiner can normally be reached on 7:30-5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Cleveland can be reached on 571-272-1418. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

MICHAEL CLEVELAND SUPERVISORY PATENT EXAMINER